

Docket No. 241206US3X

**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE**

IN RE APPLICATION OF: Seiya YAMADA, et al.

SERIAL NO: New Application

GAU:

FILED: Herewith

EXAMINER:

FOR: METHOD OF MELTING TREATMENT OF RADIOACTIVE METALS

**INFORMATION DISCLOSURE STATEMENT UNDER 37 CFR 1.97**

COMMISSIONER FOR PATENTS  
ALEXANDRIA, VIRGINIA 22313

SIR:

Applicant(s) wish to disclose the following information.

**REFERENCES**

- ☒ The applicant(s) wish to make of record the references listed on the attached form PTO-1449. Copies of the listed references are attached, where required, as are either statements of relevancy or any readily available English translations of pertinent portions of any non-English language references.
- ☐ A check is attached in the amount required under 37 CFR §1.17(p).

**RELATED CASES**

- ☐ Attached is a list of applicant's pending application(s) or issued patent(s) which may be related to the present application. A copy of the patent(s), together with a copy of the claims and drawings of the pending application(s) is attached along with PTO 1449.
- ☐ A check is attached in the amount required under 37 CFR §1.17(p).

**CERTIFICATION**

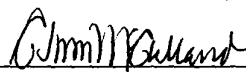
- ☐ Each item of information contained in this information disclosure statement was first cited in a communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of this statement.
- ☐ No item of information contained in this information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application or, to the knowledge of the undersigned, having made reasonable inquiry, was known to any individual designated in 37 CFR §1.56(c) more than three months prior to the filing of this statement.

**DEPOSIT ACCOUNT**

- ☒ Please charge any additional fees for the papers being filed herewith and for which no check is enclosed herewith, or credit any overpayment to deposit account number 15-0030. A duplicate copy of this sheet is enclosed.

Respectfully submitted,

OBLON, SPIVAK, McCLELLAND,  
MAIER & NEUSTADT, P.C.



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**STATEMENT OF RELEVANCY**

**Reference AO on Form PTO-1449:**

**Relevancy of Japanese Examined Patent Publication No. 5-31759 with the invention**

This prior art discloses a method of melting decontamination of radioactive metals, comprising the steps of adding slag materials consisting of basic inorganic oxides and acidic inorganic oxides to metals that are contaminated by nuclear fuel materials, and thermally melting the same to include the nuclear fuel material in the slag, wherein the acidic inorganic oxides are silic acid, and the basic inorganic oxides of which the basicity is between 1 and 2 are used.

However, as the conventional treatment method performs the separation process by confining radioactive substances such as uranium oxide in the slag, a sufficient amount of slag materials need to be added so that the slag containing uranium would necessarily reach a substantial amount. As the slag containing uranium must be treated in the same away as high-level contaminated wastes, these slag materials not only become secondary wastes but the separated metallic components thereof need to be treated, thus resulting in insufficient reduction of volume.

Form PTO 1449 (Modified)		U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE		ATTY DOCKET NO. <b>241206US3X</b>		SERIAL NO. <b>New Application</b>	
LIST OF REFERENCES CITED BY APPLICANT				APPLICANT <b>Seiya YAMADA, et al.</b>			
				FILING DATE <b>Herewith</b>		GROUP	
<b>U.S. PATENT DOCUMENTS</b>							
EXAMINER INITIAL		DOCUMENT NUMBER	DATE	NAME	CLASS	SUB CLASS	FILING DATE IF APPROPRIATE
	AA						
	AB						
	AC						
	AD						
	AE						
	AF						
	AG						
	AH						
	AI						
	AJ						
	AK						
	AL						
	AM						
	AN						
<b>FOREIGN PATENT DOCUMENTS</b>							
		DOCUMENT NUMBER	DATE	COUNTRY	TRANSLATION YES                      NO		
	AO	5-31759	5/13/93	Japan			X
	AP						
	AQ						
	AR						
	AS						
	AT						
	AU						
	AV						
<b>OTHER REFERENCES (Including Author, Title, Date, Pertinent Pages, etc.)</b>							
	AW	"2002 FALL MEETING OF THE ATOMIC ENERGY SOCIETY OF JAPAN", August 5, 2002					
	AX						
	AY						
	AZ					<input type="checkbox"/> Additional References sheet(s) attached	
Examiner					Date Considered		
*Examiner: Initial if reference is considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.							